

## Amy Edwards Simonson

USGS New York Water Science Center, 2045 Route 112, Building 4, Coram, NY 11727

Office 631-736-0783 ext. 122, [asimonso@usgs.gov](mailto:asimonso@usgs.gov), <https://profile.usgs.gov/asimonso>

### EDUCATION

---

M.S. in Geology, 2007, University of Delaware, Newark, DE

B.S. in Geology, 2004, College of William and Mary, Williamsburg, VA

### PROFESSIONAL EXPERIENCE

---

U.S. Geological Survey, Hydrologic Technician, Coram, NY	2012 - Present
U.S. Geological Survey Contractor, Environmental Scientist, Coram, NY	2010 - 2012
Dept. of Environmental Quality, Hydrologic Technician Charlottesville, VA	2007 - 2010
University of Delaware, Teaching Assistant, Newark, DE	2004 - 2006

### RESEARCH PROJECTS

---

2014 - Present	One of the primary investigators for “Estuarine Physical Response to Storms—Jamaica Bay” <a href="#">[link]</a>
2012 - Present	Assist with data collection and analysis for “Evaluation of a barrier-island breach created by Hurricane Sandy at Fire Island National Seashore, N.Y.” <a href="#">[link]</a>
2007 - 2008	Assisted with data collection and analysis as part of “Quantifying Components of the Hydrologic Cycle in Virginia using Chemical Hydrograph Separation and Multiple Regression Analysis” <a href="#">[link]</a>

### PEER-REVIEWED PUBLICATIONS

---

Schubert, C.E., Busciolano, Ronald, Hearn, P.P., Jr., Rahav, A.N., Behrens, Riley, Finkelstein, Jason, Monti, Jack, Jr., and Simonson, A.E., 2015, Analysis of storm-tide impacts from Hurricane Sandy in New York [\[link\]](#): U.S. Geological Survey Scientific Investigations Report 2015–5036, 75 p.

Simonson, A.E., Behrens, R., 2014. Measuring Storm Tide and High-Water Marks caused by Hurricane Sandy in New York [\[link\]](#), in Learning from the Impacts of Superstorm Sandy, ed. J.B. Bennington and E.C. Farmer, Elsevier, pp. 7-19.

Simonson, A.E., 2014. Period-of-record peak discharges through July 2014 and peak discharges during the flood of August 13, 2014, at selected U.S. Geological Survey streamgages in Nassau and Suffolk Counties, New York [\[table\]](#). New York Water Science Center Press Release, <http://ny.water.usgs.gov/newsroom/>, updated Sept. 11, 2014.

Simonson, A. E., Lockwood, R., Wehmiller, J., 2013. Three approaches to radiocarbon calibration of amino acid racemization in *Mulinia lateralis* from the Holocene of the Chesapeake Bay, USA [\[link\]](#), Quaternary Geochronology, v. 16, pp. 62-72.

Edwards, A., 2007. Holocene molluscan aminochronology and time averaging in Chesapeake Bay sediments. Master’s thesis, University of Delaware, 164 pp.

Cronin, T., and Edwards, A., October 2004. Temporal trends in benthic microfossils in Pocomoke Sound: implications for water quality [\[link\]](#), in Pocomoke Sound sedimentary and ecosystem history, ed. TM Cronin, U.S. Geological Survey Open-File Report 2004-1350, pp. 87-112.

## Amy Edwards Simonson

USGS New York Water Science Center, 2045 Route 112, Building 4, Coram, NY 11727

Office 631-736-0783 ext. 122, [asimonso@usgs.gov](mailto:asimonso@usgs.gov), <https://profile.usgs.gov/asimonso>

Edwards, A., 2004. Influences of historical land-use change on Chesapeake Bay, reconstructed from environmentally sensitive benthic ostracodes. Undergraduate thesis, College of William and Mary, 32 pp.

### INVITED PRESENTATIONS

---

Simonson, A.E., 2015. Streamflow Monitoring & 100-year Floods on Long Island” for Town of Islip Office of Emergency Management Table Top Exercise, in Islip, NY, August 5, 2015.

Simonson, A.E., 2015. USGS Storm-Tide Monitoring Program and Forecast Collaboration, for Nassau County Emergency Management Symposium, in Bethpage, NY, May 28, 2015.

Simonson, A.E., 2015. Measuring Storm Tide and High-Water Marks caused by Hurricane Sandy in New York, for “Are We Ready for the Next Hurricane? A Symposium on Superstorm Sandy and Preparedness” at Hofstra University, in Hempstead, NY, April 30, 2015.

Simonson, A.E., 2014. Measuring 100-year floods on Long Island, for Society of Women Engineers at Farmingdale State College in Farmingdale, NY, November 13, 2014.

Schubert, C.E., and Simonson, A.E., 2013. Measurements of Storm-tide Impacts from Hurricane Sandy – Time Series, Flood Marks and Breach Dynamics, at Long Island - New York City Emergency Management Conference, Uniondale, NY, May 29-30, 2013.

### ABSTRACTS, POSTERS, AND PRESENTATIONS

---

Simonson, A.E., 2013. Measuring Storm Tide and High-Water Marks caused by Hurricane Sandy in New York [[invited abstract](#)], in GSA Abstracts with Programs, Vol. 45, No. 7, p.51, Oct 27-30, 2013.

Simonson, A.E., 2013. From Montauk to Manhattan – Measuring Storm Tide and High-Water Marks caused by Hurricane Sandy in New York [[abstract](#)], in Association of Long Island Geologists, 20th Conference on the Geology of Long Island and Metropolitan New York, State University of New York at Stony Brook, NY, April 13, 2013.

Simonson, A.E., Lange, A., 2012. Monitoring hydrologic conditions in the Pine Barrens of eastern Suffolk County, New York [[abstract](#)], Seventeenth Annual Pine Barrens Research Forum, at Brookhaven National Laboratory, Upton, NY, October 4-5, 2012.

Busciolano, R., Schubert, C., Simonson, A.E., 2012. Monitoring storm tide from Hurricane Irene in southeastern New York State. Hofstra University Water Science Symposium [poster], at Hofstra University, Hempstead, NY, May 2, 2012.

Simonson, A. E., Lockwood, R., Wehmiller, J., 2011. Three radiocarbon calibration techniques for amino acid racemization in *Mulinia lateralis* from the Holocene of the Chesapeake Bay, USA [[abstract](#)], at 2011 INQUA meeting, Bern, Switzerland, July 21-27 2011.

Edwards, A., Wehmiller, J., Lockwood, R., Kaufman, D., Bright, J., Cronin, T., Willard, D., March 2010. Three radiocarbon calibration techniques for amino acid racemization in Holocene Chesapeake Bay mollusks [[abstract](#)]. GSA Abstracts with Programs, Vol. 42, No. 1, p. 177.

Edwards, A., Wehmiller, J., Lockwood, R., Kaufman, D., Bright, J., Cronin, T., Willard, D., October 2005. Holocene aminochronology and time-averaging for Chesapeake Bay *Mulinia* [[abstract](#)]. GSA Abstracts with Programs, Vol. 37, No. 7, p. 15.

## **Amy Edwards Simonson**

USGS New York Water Science Center, 2045 Route 112, Building 4, Coram, NY 11727

Office 631-736-0783 ext. 122, [asimonso@usgs.gov](mailto:asimonso@usgs.gov), <https://profile.usgs.gov/asimonso>

Edwards, A., Wehmiller, J., Lockwood, R., Cronin, T., Willard, D., Kaufman, D., Bright, J., 2005. Holocene molluscan aminostratigraphy of Chesapeake Bay sediments [[abstract](#)], GSA Abstracts with Programs, Vol. 37, No. 2, p. 8.

Edwards, A., Cronin, T., 2004. Influences of historical land-use change on Chesapeake Bay, reconstructed from environmentally sensitive benthic ostracodes [[abstract](#)]. GSA Abstracts with Programs, Vol. 36, No. 2, p. 70.

## **MEDIA INTERVIEWS**

---

“Sensors used to measure Sandy's surge” by Emily C. Dooley, *Newsday*, November 1, 2012 [[link](#)].

“In the Geosciences, Business Is Booming” by Carolyn Gramling, *Science*, August 08, 2008 [[link](#)].

## **COMPETITIVE GRANTS**

---

Geological Society of America, Spring 2005, for data analysis and laboratory supplies.

Northern Arizona University, Summer 2005, for data collection and travel.